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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/914,907	09/05/2001	Dennis A Zimmerman	79188-PCT	7863

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EXAMINER
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CHANG, SHIRLEY

ART UNIT	PAPER NUMBER
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2614

DATE MAILED: 06/08/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/914,907

Applicant(s)

ZIMMERMAN, DENNIS A

Examiner

Shirley Chang

Art Unit

2614

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE \_\_\_\_ MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) <sup>1-3</sup>~~1-6~~ is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 7 and 8 is/are allowed.
- 6) ☒ Claim(s) 1, 2, 4 and 5 is/are rejected.
- 7) ☒ Claim(s) 3 and 6 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_.

***Claim Objections***

Claim 5 is objected to because of the following informalities: line 7 has "block 62".

See MPEG 608.01 m. Appropriate correction is required.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

1. Claims 1, 4, and 5 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zimmerman (5,777,662) in view of Kay (6,166,760), in further view of Stokes (3,619,782).

As to claim 1, Zimmerman teaches the claimed transmitter and antenna is met by that shown in Figure 3. The claimed receiver at the cable entry location of a test site is met by that shown in Figure 1, wherein said receiver has a tuner 51 as shown in Figure 5, and inherently, a signal detector (claimed tuner and signal detector). Furthermore, a signal is "transmitted via antenna" (column 4, lines 25-26) (claimed radiating signal). The reference differs from that claimed, in that it does not disclose specifically, a shielded receiver nor a receiver with a display, wherein radiated signal is observed.

Instead, the reference discloses a System Status Display 60, Figure 5. Stokes discloses an "electromagnetic shield around the user's receiver" (column 2, lines 8-11) (claimed shielded receiver). Kay discloses a LED display 322, Figure 3 for displaying "the strength of the RF signal output from the subscriber terminal" (Column 3, lines 54-58) (claimed display for receiver). Therefore, it would it would have been obvious to one of ordinary skill in the art of the time the invention was made to modify the Zimmerman receiver with Kay so as to incorporate a display to view the reaction of radiating signals, as to allow a user to operate a unitary device to facilitate implementation of the testing hardware. Furthermore, it would it would have been obvious to one of ordinary skill in the art of the time the invention was made to further modify the Zimmerman receiver with Stokes so as to incorporate a shield, as to minimize interference (column 2, lines 6-11).

As to claim 4, Zimmerman (5,777,662) meets the claimed desired frequency of between "5 MHz and 50MHz" (Column , line 24).

As to claim 5, said receiver has a tuner 51 as shown in Figure 5 (claimed input tuner); an inherent signal detector (claimed signal detector); and a connector as shown in Figure 1, for connecting the monitoring receiver 171 to a ground block at the head-end (claimed "connector for connecting the monitoring receiver to the cable system cable ground block"). Although the ground block is not explicitly shown in the figure, it is inherent that cable signals are grounded on either end of a cable network for two-way

Art Unit: 2614

communication systems, thereby giving existence to a ground block at the head end. The reference differs from that claimed, in that it does not disclose specifically a receiver with a display, wherein radiated signal is observed. Instead, the reference discloses a System Status Display 60, Figure 5. Kay discloses a LED display 322, Figure 3 for displaying "the strength of the RF signal output from the subscriber terminal" (Column 3, lines 54-58) (claimed display for receiver). Therefore, it would it would have been obvious to one of ordinary skill in the art of the time the invention was made to modify the Zimmerman receiver with Kay so as to incorporate a display to view the reaction of radiating signals, as to allow a user to operate a unitary device to facilitate implementation of the testing hardware.

2. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Zimmerman (5,777,662) in view of Kay (6,166,760), in further view of Reichert, Jr. (4,520,508).

As to claim 2, Zimmerman teaches that branches, subscriber drops and the like characterize a typical coaxial cable plant (column 3, lines 44-47) (claimed test site having a plurality of cable connections). Furthermore, he teaches the "transmitter transmitting signals to be received at the head end location via the head end receiver" (column 4, lines 24-26) (claimed "radiating another electrical signal of desired frequency..."). The reference differs from that claimed, in that it does not disclose a method of "individually temporarily disconnecting any one of said plurality of cable

Art Unit: 2614

connections in the test site" nor "observing said display." Reichert, Jr. discloses a "procedure used to locate a fault in a cable, wherein increasingly smaller sections of the cable system are switched out of the system...and require the interruption of transmission to those subscribers whose receivers are connected to the sections of the cable system that are temporarily disconnection" (column 2, lines 32-46) (claimed steps of individually temporarily disconnecting...). Kay discloses a LED display 322, Figure 3 for displaying "the strength of the RF signal output from the subscriber terminal" (Column 3, lines 54-58) (claimed display for receiver). Therefore, it would it would have been obvious to one of ordinary skill in the art of the time the invention was made to modify the Zimmerman method with Reichert, Jr. so as to allow the repair technician to "locate a fault in a cable." For example, after the technician locate an area from the GPS unit, a the Reichert, Jr. method can help the technician pinpoint exactly which cable is at fault. Furthermore, it would it would have been obvious to one of ordinary skill in the art of the time the invention was made to modify the Zimmerman receiver with Kay so as to incorporate a display to view the reaction of radiating signals, as to allow a user to operate a unitary device to facilitate implementation of the testing hardware."

***Allowable Subject Matter***

3. Claims 3 and 6 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Art Unit: 2614

4. Claims 7 and 8 are allowed.

The following is a statement of reasons for the indication of allowable subject matter: the prior art, alone or in combination, does not teach or fairly suggest providing "an activation encoder and activation transmitter in said receiver, and providing an activation receiver and an activation decoder in said transmitter, such that when it is desired to test said cable system, said receiver may signal said transmitter and said transmitter may activate said receiver and then radiate said signal of a desired frequency."

The most applicable art of record, the Bell, Jr. (4,127,917) and Carnahan et al. (4,654,661) references do not constitute 'prior' art. However, the following is noted. The Bell, Jr. reference discloses that "transmitters are normally battery powered and can be remotely activated so that they remain dormant most of the time and are activated only when an operator wishes" (column 1, lines 21-26). However, the receiver is not specifically mentioned as being activated by the receiver. The Carnahan et al. reference teaches a "transmitter operation prevented until a specific sequence of events takes place" (column 3 lines 1-2) to prevent the transmitter from "inadvertently broadcast" (column 2, lines 45-48). Once again however, the receiver is not mentioned in activating the transmitter.

As to claims 3, 6, 7, and 8 the same references fail to teach or suggest that which is noted above for similar aforementioned reasons.


### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Shirley Chang whose telephone number is (571)272-8546. The examiner can normally be reached on 8:30-5 M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Miller can be reached on (571)272-7353. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

SC

  
JOHN MILLER  
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